AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

LISTING OF CLAIMS:

1-43. (canceled)

44. (currently amended) Monocyte-derived antigen-presenting cells (MD-APCs) having been produced by differentiating blood monocytes in vitro, in the presence of lymphocytes, GM-CSF and at least one ligand having a receptor on the surface of monocytes, said MD-APCs having, when compared with monocyte derived macrophages prepared in the ~~present~~ presence of GM-CSF only, higher phagocytic properties of formalin fixed yeast and higher ability for stimulation of allogenic T lymphocytes.--

45. (canceled)

46. (previously presented) The monocyte-derived antigen-presenting cells of claim 44, wherein said capacity for antigen presentation is evidenced by the property of stimulating the proliferation of allogenic lymphocytes as measured in an allogenic primary mixed lymphocyte reaction (MLR) test.

47. (previously presented) The monocyte-derived antigen-presenting cells of claim 44, wherein said phagocytic capacity is evidenced by an uptake of formalin-fixed yeast after culturing MD-APCs for 2 hours, adding yeast in 1/10 macrophages/yeast ratio and incubating at 37°C, 5% CO_2 atmosphere for 2-3 hours fixing by the May Grünwald-Giemsa (MGG) staining, and the percentage of phagocytic monocyte-derived antigen-presenting cells being quantified by microscopic analysis.--

48. (canceled)

49. (previously presented) The monocyte-derived antigen-presenting cells of claim 44, wherein said monocyte-derived antigen-presenting cells are substantially devoid of surface antigen CD83.

50. (previously presented) The monocyte-derived antigen-presenting cells of claim 44, wherein said monocyte-derived antigen-presenting cells present adherent properties as determined by MD-APCs culture for 2 hours in culture medium of one of I.M.D.M. and R.P.M.I. on plastic flasks and the percentage of adherent cells is quantified by microscopic analysis.--

51. (previously presented) The monocyte-derived antigen-presenting cells of claim 44, with the property of

stimulating the proliferation of allogenic lymphocytes as determined in an allogenic primary mixed lymphocytes reaction (MLR) test carried out by adding different numbers of MD-APCs to purified allogenic T cells.

52. (canceled)

53. (previously presented) The monocyte-derived antigen-presenting cells of claim 47, wherein said monocyte-derived antigen-presenting cells are substantially devoid of surface antigen CD83 as determined by immunofluorescence staining and flow cytometry analysis.

54. (previously presented) The monocyte-derived antigen-presenting cells of claim 47, wherein said monocyte-derived antigen-presenting cells present adherent properties as determined by MD-APCs culture for 2 hours in a culture medium of one of I.M.D.M. and R.P.M.I..

55. (previously presented) Monocyte-derived antigen-presenting cells (MD-APCs) which present the following properties:

(a) the presence on the MD-APC cell surface of surface antigens CD80 and CD86; and

(b) the presence on the MD-APC cell surface of surface antigen CD14,

said MD-APCs have been produced by differentiating blood monocytes in vitro, in the presence of lymphocytes, GM-CSF and at least one ligand having a receptor on the surface of monocytes, said MD-APCs having, when compared with monocyte derived macrophages prepared in the presence of GM-CSF only, higher phagocytic properties of formalin fixed yeast and higher ability for stimulation of allogenic T lymphocytes.

56-59 (canceled)

60. (previously presented) The monocyte-derived antigen-presenting cells of claim 55, wherein said monocyte-derived antigen-presenting cells are substantially devoid of the surface antigens CD1a and CD1c.

61. (previously presented) The monocyte-derived antigen-presenting cells of claim 55, wherein said phagocytic capacity is evidenced by an uptake of formalin-fixed yeast after culturing MD-APCs for 2 hours, adding yeast in 1/10 MD-APCs/yeast ratio and incubating at 37°C, 5% CO_2 atmosphere for 2-3 hours fixing by the May-Grünwald-Giesma (MGG) staining, and the percentage of phagocytic MD-APCs being quantified by microscopic analysis.

62-87 (canceled)

88. (previously presented) An ex vivo cellular composition containing monocyte-derived antigen-presenting cells (MD-APCs) having been produced by differentiating blood monocytes in vitro, in the presence of lymphocytes, GM-CSF and at least one ligand having a receptor on the surface of monocytes, said cellular composition having, when compared with a cellular composition containing monocyte derived macrophages prepared in the presence of GM-CSF only, higher phagocytic properties of formalin fixed yeast and higher ability for stimulation of allogenic T lymphocytes.

89. (new) The monocyte-derived antigen-presenting cell (MD-APCs) according to claim 44, wherein said at least ligand having a receptor on the surface of monocytes is selected from the group consisting of cimetidine and histamine, and IL-13.

90. (new) A monocyte-derived antigen-presenting cell (MD-APCs) having been produced by differentiating blood monocytes *in vitro* in a culture medium, in the presence of lymphocytes, GM-CSF and at least one ligand having a receptor on the surface of monocytes, said MD-APCs having when compared with monocyte-derived macrophages prepared in the presence of

GM-CSF only, having higher phagocytic properties of formalin fixed yeast and higher ability for stimulation of allogenic T lymphocytes, wherein the culture medium comprises cimetidine and histamine and does not contain IL-4, IL-10, and TNF.